WHAT IS CLAIMED IS:

1. A method for identifying an HLA genotype of a subject, the method comprising:

(a) obtaining a sample comprising a template nucleic acid from said subject;

(b) amplifying said template nucleic acid with a plurality of HLA allele-specific forward primers and HLA allele-specific reverse primers to form amplification products,

wherein said forward primers or reverse primers comprise a detectable label;

(c) hybridizing said amplification products with a plurality of HLA locus-specific capture oligonucleotides immobilized on a solid phase to form a plurality of detectable complexes; and

(d) detecting said detectable complexes to identify said HLA genotype of said subject.

2. A method for identifying an HLA genotype of a subject, the method comprising:

(a) obtaining a sample comprising a template nucleic acid from said subject;

(b) amplifying said template nucleic acid with a plurality of HLA allele-specific forward primers and HLA allele-specific reverse primers to form amplification products,

wherein said forward primers or reverse primers comprise a detectable label;

(c) hybridizing said amplification products with a plurality of HLA locus-specific capture oligonucleotides to form a plurality of detectable complexes;

(d) immobilizing said detectable complexes on a solid phase; and

(e) detecting said detectable complexes to identify said HLA genotype of said subject.

3. The method according to claim 1 or 2, wherein said template nucleic acid is isolated from blood or cord blood.

4. The method according to claim 1 or 2, wherein said template nucleic acid is cDNA or genomic DNA.

5. The method according to claim 1 or 2, wherein said solid phase is a member selected from the group consisting of: a bead, a chip, a microtiter plate, a polycarbonate microtiter plate, polystyrene microtiter plate, and a slide.

6. The method according to claim 1 or 2, wherein said HLA genotype is a class I HLA genotype.

7. The method according to claim 1 or 2, wherein said HLA allele-specific forward primers and HLA allele-specific reverse primers are selected from the group consisting of:

SEQ ID NOS:1-160.

8. The method according to claim 1 or 2, wherein said locus-specific capture oligonucleotides are selected from the group consisting of:

SEQ ID NOS:165-168.

9. The method according to claim 8, wherein said capture oligonucleotides further comprise a 5' amine group or a 5'$(T)_{5-20}$ oligonucleotide sequence.

10. The method according to claim 1 or 2, wherein said HLA genotype is a class II HLA genotype.

Sub D1

11. The method according to claim 1 or 2, wherein said HLA allele-specific forward primers and HLA allele-specific reverse primers are selected from the group consisting of:selected from the group consisting of:

SEQ ID NOS: 169-269.

Sub B1

12. The method according to claim 1 or 2, wherein said ~~locus-specific~~ capture oligonucleotides are selected from ~~the~~ group consisting of:

SEQ ID ~~NOS:~~ 270-275.

13. The method according to claim 12, wherein said capture oligonucleotides further comprise a 5' amine group or a 5'$(T)_{5-20}$ oligonucleotide sequence.

14. The method according to claim 1 or 2, wherein said detectable label comprises a member selected from the group consisting of:

radioactive moiety, a fluorescent moiety, a chemiluminescent moiety, an antigen, and a binding protein.

15. The method of claim 14, wherein said fluorescent moiety is fluorescein or 5-(2'-aminoethyl) aminonaphtalene-1-sulfonic acid (EDANS).

16. A method for identifying an HLA genotype of a subject, the method comprising:

(a) isolating template nucleic acid from a sample from said subject;

(b) immobilizing a plurality of HLA allele-specific reverse primers on a solid phase;

(c) amplifying said template nucleic acid with a plurality of HLA allele-specific forward primers and said immobilized reverse HLA allele-specific reverse primers to form amplification products,

wherein said forward primers comprise a detectable label; and

(d) detecting said amplification products to identify said HLA genotype of said subject.

17. The method according to claim 16, wherein said template nucleic acid is cDNA or genomic DNA.

18. The method according to claim 16, wherein said template nucleic acid is isolated from blood or cord blood.

19. The method according to claim 16, wherein said solid phase is a member selected from the group consisting of: a bead, a chip, a microtiter plate, a polycarbonate microtiter plate, polystyrene microtiter plate, and a slide.

20. The method according to claim 16, wherein said HLA genotype is a class I HLA genotype.

21. The method according to claim 16, wherein said HLA allele-specific reverse primers and said HLA allele-specific forward primers are selected from the group consisting of:

SEQ ID NOS:1-160.

22. The method according to claim 16 wherein said HLA allele-specific reverse primers further comprise a 5' amine group or a 5'$(T)_{5-20}$ oligonucleotide sequence.

23. The method according to claim 16, wherein said HLA genotype is a class II HLA genotype.

24. The method according to claim 16, wherein said HLA allele-specific reverse primers and said HLA allele-specific forward primers are selected from the group consisting of:

SEQ ID NOS: 169-269.

25. The method according to claim 16, wherein said detectable label comprises a member selected from the group consisting of:

radioactive moiety, a fluorescent moiety, a chemiluminescent moiety, an antigen, and a binding protein.

26. The method of claim 25, wherein said fluorescent moiety is fluorescein or 5-(2'-aminoethyl) aminonaphtalene-1-sulfonic acid (EDANS).

27. The method of claim 16, wherein said forward primers and said reverse primers are selected from the group consisting of :

SEQ ID NOS:1-160.

28. The method of claim 16, wherein said forward primers and said reverse primers are selected from the group consisting of :

SEQ ID NOS: 169-269.